Incidence of Foodborne Illnesses in the United States , FoodNet, 2002

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Background An estimated 76 million persons contract a foodborne illness each year in the United States. In 1996, CDC's Emerging Infections Program established the Foodborne Diseases Active Surveillance Network (FoodNet) to follow trends in specific foodborne infections by using laboratory-based surveillance for culture-confirmed illnesses caused by several enteric pathogens commonly transmitted through food.

Methods FoodNet conducted active surveillance in 9 states for laboratory-diagnosed cases of *Campylobacter* , Shiga toxin-producing *E. coli* (STEC) O157, *Listeria monocytogenes* , *Salmonella* , *Shigella* , *Vibrio* , and *Yersinia enterocolitica* . FoodNet personnel contacted all clinical laboratories in their surveillance area to identify cases, which represent the first isolation of a pathogen from a resident of the catchment area by a clinical laboratory. A main effects log-linear Poisson regression model was used to estimate the relative change in incidence of the various pathogens from 1996 to 2002; 1996 was the reference year.

Results During 2002, a total of 15,926 laboratory-diagnosed cases of 7 bacterial infections under surveillance were identified. From 1996-2002, the estimated incidence of *Campylobacter* decreased 24%, *Listeria* decreased 38%, and *Yersinia* decreased 43%. During the same period, the incidence of *Salmonella* overall did not change significantly but the incidence of *S.* Newport increased 87% and *S.* Typhimurium decreased 31%. There was little change in the incidence of *S.* Enteritidis, *E. coli* O157, or *Shigella* . The incidence of *Vibrio* increased 126%.

Conclusions From 1996 to 2002, the incidence of *Campylobacter* , *Listeria* , and *Yersinia* declined. The changes in incidence of these infections occurred in the context of several control measures, including implementation by the U.S. Department of Agriculture's Food Safety and Inspection Service (FSIS) of the Pathogen Reduction/Hazard Analysis and Critical Control Point (HACCP) systems regulations in meat and poultry slaughter and processing plants. Additionally, the U.S. Food and Drug Administration introduced several interventions to reduce food contamination.